COPS
COMMUNITY ORIENTED POLICING SERVICES
U.S. DEPARTMENT OF JUSTICE

COPS MORE: Redeployment by Shift

Introduction

The Neely County Sheriff's Department applies for a MORE grant to purchase 10 Mobile Data Terminals (MDTs). The department has 20 full-time officers assigned to patrol, each MDT will be used by more than one officer. Currently, each patrol officer runs an average of 20 tag or license checks per shift. Each check takes about five minutes. If the department receives the MORE grant, they estimate that each officer will only need three minutes per check, a savings of two minutes per check. The cost of the 10 MDTs is $100,000. To determine their required level of redeployment, the department would use the following formula which is laid out in the Cost Effectiveness Worksheet portion of the grant application:

Required Redeployment

Line 1 - Entry level salary of SWORN police officer (as of Jan. 1, 1998)	1.	$28,000	
Line 2 - Fringe benefits of SWORN police officer (as of Jan. 1, 1998)	2.	$ 5,000	
Line 3 - Add lines 1 and 2	3.	$33,000	
Line 4 - Multiply line 3 by .75	4.	$24,750	
Line 5 - Enter figure on line 4 or $25,000, whichever is less	5.	$24,750	
Line 6 - Total cost of item, system, or group of like items	6.	$100,000	(100%)
Line 7 - Federal amount requested Can be no more than 75% of total item cost (line 6)	7.	$75,000	(75%)
Line 8 - Divide line 7 by line 5	8.	**3.03 FTEs**	

Actual Redeployment

The formula used to calculate the estimated actual redeployment for this grant would be:

2 min. saved X 20 checks = 40 min. per shift
40 min./shift X 20 officers x 228 shifts = 182,400 min./yr.
182,400 min./60min. = 3,040 hrs. per yr.
3,040 hrs. /1,824 hrs. (COPS standard) = 1.66 FTEs
1.66 FTE saved per year

This is less than the required amount in the above calculation, but as demonstrated below, the department plans to use the MDTs for other uses also.

The department also states that they will use the laptops for report writing while their patrol officers are in their vehicles. Again the laptops will be used by more than 1 officer. Currently, each of the 20 officers spends two hours per shift writing their reports. With the laptops they believe they can save 1 hour per shift. The reports will have automated formats and can be sent for approval via modem versus driving back to the station.

The formula used to calculate the estimated actual redeployment is:

1 hr. per shift X 20 officers X 228 shifts = 4,560 hrs. per yr.
4,560 hrs./ 1824 hrs. (COPS standard)= 2.5 FTEs

So by saving 1.66 FTEs with the tag checks and 2.5 FTEs with the reports, the department projects a total redeployment of 4.1 FTE, which is above the minimum required and the department receives the grant.

Redeployment Tracking Plan

The next task for the Neely County Sheriff's Department is to develop a redeployment tracking plan for its MORE grant. The agency begins its redeployment tracking plan with a short summary of the project and how it will save time for officers within the agency:

> "The Neely County Sheriff's Department has been awarded a COPS MORE grant for 10 mobile data computers. These mobile data computers will be used as part of a pilot project to assess the effectiveness of automated field reporting in this agency. We believe that this new technology will allow patrol officers to perform quicker records checks and that it will make our reporting process more efficient. Through the assistance of the grant-funded technology, officers will be able to conduct their own records checks without going through dispatch. The field reporting system will reduce the need to enter duplicate information for accident and incident reports and will save officer travel time by allowing patrol officers to electronically transmit their reports to their supervisor."

The next part of the plan explains of the method that the Neely County Sheriff's Department will use to track the time savings from its grant-funded technology:

> "The Neely County Sheriff's Department will track the time savings from the grant-funded mobile data computers by comparing the survey results of the officers using the new equipment to the survey results (baseline) of the patrol officers writing reports prior to the implementation of the grant technology. For one week during each quarter, the 20 officers using the mobile data computers will track the number of records checks and reports that they write per day and how long these activities take them. Prior to the grant award, the Sheriff's Department completed log sheets which demonstrated the time necessary to complete various checks and reports. The responses will be compared to determine the amount of time savings produced by the new technology."

The final part of the redeployment tracking plan includes an explanation of how the time saved through this grant will allow this agency to enhance its community policing efforts:

> "The officers using the computers will devote approximately one hour of their time savings per day to problem-solving projects. During this time the officers will contact community residents to identify community concerns and will work with community and city agencies to proactively address the causes of these concerns. The officers will respond to a minimal number of calls for service during this time."

Implementing the Redeployment Tracking Plan

The Neely County Sheriff's Department begins to implement its redeployment tracking plan once the grant-funded technology has been purchased and becomes fully operational. For one week during each quarter of the one-year redeployment tracking period the agency requires officers to complete daily logs tracking how many reports and records checks are performed by officers and how long these activities take. These logs are completed by the twenty officers using the mobile data computers and compared to the time survey completed prior to the implementation of the technology. The results from the logs are used to form projections for time savings over a one-year period.

Group One: 20 officers prior to technology implementation

	Week 1	Week 2	Week 3	Week 4	Overall Averages
# shifts	100	110	120	105	
Total hours report writing time	400	312	450	400	
Average hours writing reports per shift	4.00	3.12	3.75	3.80	3.67 hours
Total hours for records checks	180	190	220	210	
Average hours performing records checks per shift	1.8	1.7	1.8	2.0	1.8 hours

Group Two: 20 officers with mobile data computers

	Week 1	Week 2	Week 3	Week 4	Overall Averages
# shifts	100	110	120	105	
Total hours report writing time	306	312	400	320	
Average hours writing reports per shift	3.00	3.12	3.33	3.05	3.13 hours
Total hours for records checks	150	200	180	130	
Average hours performing records checks per shift	1.5	1.8	1.5	1.2	1.5 hours

Group One: 3.67 hrs. report writing per shift + 1.8 hrs. performing records checks per shifts = 5.47 hrs.

Group Two: 3.13 hrs. report writing per shift + 1.5 hrs. performing records checks per shifts = 4.63 hrs.

Time Savings = 5.47 hrs. for officers without technology - 4.63 hrs. for officers with technology = 0.84 hrs. saved per shift

0.84 hrs. per shift * 20 officers * 228 shifts (COPS Office standard) = 3,830hrs.
3,830 hrs./ 1824 hrs. (COPS Office standard) **= 2.1 FTEs saved**

In this case, the grantee demonstrated a time savings of 2.1 full-time equivalents. While its actual redeployment fell short of the 3.03 FTE required redeployment for the grant, the grantee could document other unanticipated time savings or other types of benefits which may have occurred as a result of the project to evaluate the project's effectiveness.